Remarks

Basis for Amendments

In the claims, claims 1-4, 8-11, 13-16 and 18-19 have been amended and new claims 20-25 have been added to further distinguish Applicants' claimed invention and to enable allowance of these claims. The claim amendments and additions are fully supported by the specification, as filed. There are a number of claimed features that distinguish the present claimed invention, as amended, from the cited reference, as described below.

Response to Claim Rejections Under 35 U.S.C. §112

Claims 8 and 19 have been rejected as being indefinite because of the inclusion of parentheses in the claim limitations. Accordingly, claims 8 and 19 have been amended to eliminate the parentheses in the claims.

Response to Claim Rejections Under 35 U.S.C. 103(a)

The Office has rejected claims 1-19 under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent 6,594,673 issued to Smith et al. in view of U.S. Patent 6,618,727 issued to Wheeler et al. The Office bears the initial burden of establishing a *prima facie* case of obviousness. *See In re Piasecki*, 223 USPQ785, 788 (Fed. Cir. 1984). To establish a *prima facie* case of obviousness, three basic criteria must be met. *First*, there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the references or to combine reference teachings. <u>Second</u>, there must be a reasonable expectation of success. <u>Finally</u>, the prior art reference (or references when combined) must teach or suggest all claim limitations. The teaching or suggestion to make the claimed combination and the reasonable expectation of success must both be found in the prior art, and not based on applicant's disclosure. *In re Vaeck*, 20 USPQ2d 1438 (Fed. Cir. 1991), MPEP § 2142 and § 2143.

With regard to independent claim 1-19 and newly appended claims 20-25, the Office has rejected claims 1-19 under 35 U.S.C. § 103(a) as being unpatentable over Smith et al. (U.S. Patent 6,594,673) in view of Wheeler et al. (U.S. Patent 6,618,727). The Applicants believe that claims 1-19, as amended, are not anticipated by Smith and Wheeler. First, Smith discloses the use of a database filter to obtain and measure a user-selected portion of the collaborative information. The Wheeler invention is not a database filter but a similarity search engine for determining a degree of similarity between hierarchical database objects. The Wheeler invention is distinguishable from a database filter, and therefore, it would not have been obvious for a person having ordinary skill in the art to substitute the similarity search function of Wheeler for the database filter disclosed in the Smith reference (Smith does not disclose a generic search function). Since the Wheeler disclosure is incorporated by reference into the present application, as filed, it appears that hindsight may be a factor in the conclusion drawn by the Office that it was obvious to combine the Wheeler and Smith references. The Office has not satisfied the requirement for citing some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the references or to combine reference teachings. As noted above, the teaching or suggestion to make the claimed combination must be found in the prior art, and not based on applicant's disclosure, which includes the Wheeler reference. Second, the Office has not provided a citation to demonstrate a reasonable expectation of success by combining Wheeler and Smith. In fact, without substantial construction and reconstruction, the combination of Wheeler and Smith would be inoperable and unsuccessful. As noted above, the reasonable expectation of success must be found in the prior art, and not based on applicant's disclosure. And lastly, the cited references of Wheeler and Smith fail to teach or suggest all the claim limitations of the Applicants' claimed invention. The

Applicants believe that claims 1-19 are not unpatentable over the cited references of Wheeler and Smith, and are nonobvious under 35 U.S.C. § 103(a).

Considering independent claim 1 (currently amended), the Office is incorrect in the assertion that the abstract of the Smith reference discloses a computer implemented visualization model of similarity relationships between documents. There is no disclosure in Smith of visualization of similarity relationships between documents, or of a generic search function.

Regarding the first element of independent claim 1 (currently amended), the first element includes the limitation "performing a similarity search in a database based on at least one reference attribute of at least one reference document to find at least one target document with at least one target attribute having a similarity relationship to the at least one reference attribute". The Office is incorrect in interpreting the Smith reference as performing a search. The Office citation in Smith (col. 8, lines 54-57) describes a database filter, which may function as a generally conventional relational database filter. Database filters are distinguishable from similarity search engines, as disclosed in the Wheeler reference, which is incorporated by reference into the present disclosure. The first element of independent claim 1 broadly describes the similarity search functions disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the second element of claim 1 (currently amended), the second element of includes the limitation "creating unique visualization model nodes corresponding to the at least one reference document and the at least one target document". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation

in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of creating unique visualization model nodes corresponding to the at least one reference document and the at least one target document. There is no correspondence to or disclosure of Applicants' second element of claim 1 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 1, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended third element of claim 1 (currently amended), the third element of claim 1 includes the limitation "assigning properties to the unique visualization model nodes including form item, link count, group ID, hidden count, locked, caption, color, hierarchical level, selected and ID". There is no disclosure in the Smith or Wheeler reference of the claimed assigned properties to the unique visualization model nodes. There is no correspondence to or disclosure of Applicants' third element of claim 1 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 1, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fourth element (formerly third element) of claim 1 (currently amended), the fourth element of claim 1 includes the limitation "creating unique visualization model edges corresponding to the similarity relationships between the at least one reference document and the

at least one target document". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of creating unique visualization model nodes corresponding to the at least one reference document and the at least one target document. There is no correspondence to or disclosure of Applicants' fourth element of claim 1 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 1, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended fifth element of claim 1 (currently amended), the fifth element of claim 1 includes the limitation "assigning properties to the unique visualization model edges including from node, from node ID, to node, to node ID, query list, caption, color, visible, selected and ID". There is no disclosure in the Smith or Wheeler reference of the claimed assigned properties to the unique visualization model edges. There is no correspondence to or disclosure of Applicants' fifth element of claim 1 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 1, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the sixth element (formerly fourth element) of claim 1 (currently amended), the sixth element of claim 1 includes the limitation "displaying the unique visualization model nodes and the unique visualization model edges on a graphical user interface". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of displaying the unique visualization model nodes and the unique visualization model edges on a graphical user interface. There is no correspondence to or disclosure of Applicants' sixth element of claim 1 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 1, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended seventh element of claim 1 (currently amended), the seventh element of claim 1 includes the limitation "indicating a degree of similarity between the displayed unique visualization model nodes by the displayed unique visualization model edges". There is no disclosure in the Smith or Wheeler reference of indicating a degree of similarity between visualization model nodes by the visualization model edges. There is no correspondence to or disclosure of Applicants' seventh element of claim 1 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the

Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 1, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 2 (currently amended), Applicants believe that claim 2 is not unpatentable over the cited references. Since claim 2 is dependent on claim 1, which has been shown above to be nonobvious, claim 2 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 2 is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 3 (currently amended), Applicants believe that claim 3 is not unpatentable over the cited references. Since claim 3 is dependent on claim 1, which has been shown above to be nonobvious, claim 3 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 3 is unsupported by the cited references, and should be withdrawn. Furthermore, claim 3 includes the limitations "wherein the similarity search returns a result set of the at least one reference document, the at least one target document, and similarity relationships between the at least one reference document and the at least one target document that are used by the visualization model to create the unique visualization model nodes corresponding to the documents and the unique visualization model edges corresponding to the similarity relationships between the documents". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith or Wheeler reference of using the contents of the result set to create the unique visualization model nodes corresponding to the documents and the unique visualization model edges corresponding

to the similarity relationships between the documents. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 3, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 17 (original), Applicants believe that claim 17 is not unpatentable over the cited references. Since claim 17 is dependent on claim 1, which has been shown above to be nonobvious, claim 17 (original) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 17 is unsupported by the cited references, and should be withdrawn. Furthermore, claim 17 includes the limitations "wherein the visual representation is three dimensional." The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (Fig. 13) shows a two-dimensional figure. There is no disclosure in Smith that Fig. 13 is three-dimensional. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 17, as amended, is unsupported by the cited references, and should be withdrawn.

Considering independent claim 4 (currently amended), the Office is incorrect in the assertion that the abstract of the Smith reference discloses a computer-implemented interactive visualization model of similarity relationships between documents. There is no disclosure in Smith of visualization of similarity relationships between documents, or of a generic search function.

Regarding the first element of independent claim 4 (currently amended), the first element includes the limitation "using a similarity search performed on reference attributes of a reference document which results in a set of 0 to n target documents with target attributes having similarity

relationships with the reference attribute". The Office is incorrect in interpreting the Smith reference as performing a search. The Office citation in Smith (col. 8, lines 54-57) describes a database filter, which may function as a generally conventional relational database filter. Database filters are distinguishable from similarity search engines, as disclosed in the Wheeler reference, which is incorporated by reference into the present disclosure. The first element of independent claim 4 broadly describes the similarity search functions disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the second element of claim 4 (currently amended), the second element of includes the limitation "creating visualization model nodes corresponding to the reference document and each target document". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of creating visualization model nodes corresponding to the reference document and each target document. There is no correspondence to or disclosure of Applicants' second element of claim 4 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 4, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended third element of claim 4 (currently amended), the third element of claim 4 includes the limitation "performing a lookup on a unique nodes list for determining if the created visualization model nodes already exists, adding the created visualization model nodes to the unique nodes list if the created visualization model nodes are not on the unique nodes list, and designating the visualization model nodes on the unique nodes list as unique visualization model nodes". There is no disclosure in the Smith or Wheeler reference of the claimed lookup on a unique nodes list to determine if a visualization model node is unique. There is no correspondence to or disclosure of Applicants' third element of claim 4 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 4, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fourth element (formerly third element) of claim 4 (currently amended), the fourth element of claim 4 includes the limitation "creating visualization model edges corresponding to the similarity relationships between the reference document and each target document". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of creating visualization model edges corresponding to the similarity relationships between the

reference document and each target document. There is no correspondence to or disclosure of Applicants' fourth element of claim 4 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 4, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended fifth element of claim 4 (currently amended), the fifth element of claim 4 includes the limitation "performing a lookup on a unique edges list for determining if the created visualization model edges already exists, adding the created visualization model edges to the unique edges list if the created visualization model edges are not on the unique edges list, and designating the visualization model edges on the unique edges list as unique visualization model edges". There is no disclosure in the Smith or Wheeler reference of the claimed lookup on a unique edges list to determine if a visualization model edge is unique. There is no correspondence to or disclosure of Applicants' fifth element of claim 4 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 4, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the sixth element (formerly fourth element) of claim 4 (currently amended), the sixth element of claim 4 includes the limitation "displaying the unique visualization model nodes corresponding to the reference documents and each target document and the unique visualization model edges corresponding to the similarity relationships on a graphical user interface". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a

network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of displaying the unique visualization model nodes and the unique visualization model edges on a graphical user interface. There is no correspondence to or disclosure of Applicants' sixth element of claim 4 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 4, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended seventh element of claim 4 (currently amended), the seventh element of claim 4 includes the limitation "indicating a degree of similarity between the displayed unique visualization model nodes by the displayed unique visualization model edges". There is no disclosure in the Smith or Wheeler reference of indicating a degree of similarity between visualization model nodes by the visualization model edges. There is no correspondence to or disclosure of Applicants' seventh element of claim 4 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 4, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claims 5-7 (original), Applicants believe that claims 5-7 are not unpatentable over the cited references. Since claims 5-7 are dependent on claim 4, which has been shown above to be nonobvious, claims 5-7 (original) are also nonobvious under 35 U.S.C. §

103(a). Therefore the rejections of claims 5-7 are unsupported by the cited references, and should be withdrawn.

Considering independent claim 8 (currently amended), the Office is incorrect in the assertion that the Smith reference discloses a computer-implemented visualization model of similarities between documents. There is no disclosure in Smith of a visualization model of similarities between documents, or of a generic search function.

Regarding the first element of independent claim 8 (currently amended), the first element includes the limitation "displaying a reference hierarchical object". The Office is incorrect in interpreting the Smith reference as displaying a reference hierarchical object. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no correspondence to or disclosure of Applicants' first element of claim 8 found in the Smith reference. The first element of independent claim 8 is broadly disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the second element of claim 8 (currently amended), the second element of includes the limitation "allowing a user to initiate a similarity search, based on at least one attribute of the reference hierarchical object, to find at least one target hierarchical object". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 8, lines 54-57) describes a database filter, which may function as a generally conventional relational database filter. Database filters are distinguishable from

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similarity search engines, as disclosed in the Wheeler reference, which is incorporated by reference into the present disclosure. There is no correspondence to or disclosure of Applicants' second element of claim 8 found in the Smith reference. The second element of independent claim 8 is broadly disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the third element of claim 8 (currently amended), the third element of claim 8 includes the limitation "visually representing a unique visualization model reference node corresponding to the reference hierarchical object and a unique visualization model target node corresponding to the at least one target hierarchical object that meet a similarity search criteria". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a springbased model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of visually representing a unique visualization model reference node corresponding to the reference hierarchical object and a unique visualization model target node corresponding to the at least one target hierarchical object that meet a similarity search criteria. There is no correspondence to or disclosure of Applicants' third element of claim 8 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 8, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fourth element of claim 8 (currently amended), the fourth element of claim 8 includes the limitation "visually representing a unique visualization model edge corresponding to a similarity relationship between the reference hierarchical object and each target hierarchical object". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of visually representing a unique visualization model edge corresponding to a similarity relationship between the reference hierarchical object and each target hierarchical object. There is no correspondence to or disclosure of Applicants' fourth element of claim 8 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 8, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fifth element of claim 8 (currently amended), the fifth element of claim 8 includes the limitation "displaying the visual representations of the unique visualization model nodes and the unique visualization model edge on a graphical user interface". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second

Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of displaying the visual representation of the unique visualization model nodes and the unique visualization model edges on a graphical user interface. There is no correspondence to or disclosure of Applicants' fifth element of claim 8 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 8, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended sixth element of claim 8 (currently amended), the sixth element of claim 8 includes the limitation "indicating a degree of similarity between the displayed unique visualization model nodes by the displayed unique visualization model edges". There is no disclosure in the Smith or Wheeler reference of indicating a degree of similarity between visualization model nodes by the visualization model edges. There is no correspondence to or disclosure of Applicants' sixth element of claim 8 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 8, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 9 (currently amended), Applicants believe that claim 9 is not unpatentable over the cited references. Since claim 9 is dependent on claim 8, which has been shown above to be nonobvious, claim 9 (currently amended) is also nonobvious under 35 U.S.C.

§ 103(a). Therefore the rejection of claim 9 is unsupported by the cited references, and should be withdrawn.

Regarding the first element of claim 9 (currently amended), the first element includes the limitations "wherein the unique visualization model node comprises a reference to the hierarchical object the model node represents". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 4, line 47 to col. 5, line 12) describes collaborative information represented as tabular information and as network diagrams or graphs. There is no disclosure in the Smith or Wheeler reference of the unique visualization model node comprising a reference to the hierarchical object that the model node represents. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 9, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the second element of claim 9 (currently amended), the second element includes the limitations "wherein the unique visualization model node comprises a reference to at least one attribute of the hierarchical object used in the similarity search to determine if a unique visualization model edge exists". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 4, line 47 to col. 5, line 12) describes collaborative information represented as tabular information and as network diagrams or graphs. There is no disclosure in the Smith or Wheeler reference of the unique visualization model node comprising a reference to at least one attribute of the hierarchical object used in the similarity search to determine if a unique visualization model edge exists. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 9, as amended, is

unsupported by the cited references, and should be withdrawn.

Regarding the third element of claim 9 (currently amended), the third element includes the limitations "wherein the unique visualization model node comprises visual properties of the hierarchical document the unique visualization model node represents". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 9, lines 24-52) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. Various format controls are described. There is no disclosure in the Smith or Wheeler reference of the unique visualization model node comprising visual properties of the hierarchical document the unique visualization model node represents. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 9, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 10 (currently amended), Applicants believe that claim 10 is not unpatentable over the cited references. Since claim 10 is dependent on claims 8 and 9, which have been shown above to be nonobvious, claim 10 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 10 is unsupported by the cited references, and should be withdrawn. Furthermore, claim 10 includes the limitations "storing the visual representation of the unique visualization reference model node, each unique visualization target model node, and each unique visualization model edge in computer memory or on disk." The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The

disclosure in the Smith or Wheeler reference of storing the visual representation of the unique visualization reference model node, each unique visualization target model node, and each unique visualization model edge in computer memory or on disk. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 10, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 11 (currently amended), Applicants believe that claim 11 is not unpatentable over the cited references. Since claim 11 is dependent on claim 8, which has been shown above to be nonobvious, claim 11 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 11 is unsupported by the cited references, and should be withdrawn.

Regarding the first element of claim 11 (currently amended), the first element includes the limitations "wherein the unique visualization model edge comprises an identifier of the unique visualization reference model node from which the visual representation of the unique visualization model edge will extend and an identifier of the at least one unique visualization target model node to which the visual representation of the unique visualization model edge will extend". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 4, line 47 to col. 5, line 12) describes collaborative information represented as tabular information and as network diagrams or graphs. The second Office citation in Smith (col 9, lines 24-52) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. Various format controls are also described. There is no disclosure in the Smith or

Wheeler reference of the unique visualization model edge comprises an identifier of the unique visualization reference model node from which the visual representation of the unique visualization model edge will extend and an identifier of the at least one unique visualization target model node to which the visual representation of the unique visualization model edge will extend. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 11, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the second element of claim 11 (currently amended), the second element includes the limitations "wherein the unique visualization model edge comprises a list of the similarity search attributes used in the similarity search". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 4, line 47 to col. 5, line 12) describes collaborative information represented as tabular information and as network diagrams or graphs. The second Office citation in Smith (col 9, lines 24-52) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. Various format controls are also described. There is no disclosure in the Smith or Wheeler reference of the unique visualization model edge comprises a list of the similarity search attributes used in the similarity search. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 11, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 12 (original), Applicants believe that claim 12 is not unpatentable over the cited references. Since claim 12 is dependent on claim 8 and 11, which

have been shown above to be nonobvious, claim 12 (original) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 12 is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 15 (currently amended), Applicants believe that claim 15 is not unpatentable over the cited references. Since claim 15 is dependent on claim 8, which has been shown above to be nonobvious, claim 15 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 15 is unsupported by the cited references, and should be withdrawn. Furthermore, claim 15 includes the limitations "wherein each unique visualization model edge indicates a degree of similarity between the reference hierarchical object and the target hierarchical object and is displayed as a line connecting unique visualization model nodes, said model nodes being depicted as geometric shapes on the graphical user interface." The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith or Wheeler reference of each unique visualization model edge indicating a degree of similarity between the reference hierarchical object and the target hierarchical object and is displayed as a line connecting unique visualization model nodes, said model nodes being depicted as geometric shapes on the graphical user interface. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of

claim 15, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 16 (currently amended), Applicants believe that claim 16 is not unpatentable over the cited references. Since claim 16 is dependent on claims 8 and 15, which have been shown above to be nonobvious, claim 16 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 16 is unsupported by the cited references, and should be withdrawn. Furthermore, claim 16 includes the limitations "the length of the line connecting the unique visualization model nodes varies as a function of the degree of similarity between the reference document and the target document referenced by the unique visualization model nodes." The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 9, lines 24-27) describe strengths of links between nodes in the visualization may be indicated by relative lengths of the links. There is no disclosure in the Smith or Wheeler reference of varying the length of the lines connecting the unique visualization model nodes as a function of the degree of similarity between the reference document and the target document referenced by the unique visualization model nodes. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 16, as amended, is unsupported by the cited references, and should be withdrawn.

Considering independent claim 13 (currently amended), the Office is incorrect in the assertion that the abstract of the Smith reference discloses a computer-implemented method of visualizing similarity relationships between documents. There is no disclosure in Smith of a computer-implemented method of visualizing similarity relationships between documents, or of a generic search function.

Regarding the first and second elements of independent claim 13 (currently amended),

the first and second elements include the limitations "using a reference hierarchical document, performing a similarity search based on user selected attributes of the reference hierarchical document and determining a result set of target documents comprising 0 to n hierarchical documents". The Office is incorrect in interpreting the Smith reference as performing a search. The Office citation in Smith (col. 8, lines 54-57) describes a database filter, which may function as a generally conventional relational database filter. Database filters are distinguishable from similarity search engines, as disclosed in the Wheeler reference, which is incorporated by reference into the present disclosure. The first and second elements of independent claim 13 broadly describes the similarity search functions disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the third element of claim 13 (currently amended), the third element of includes the limitation "converting each hierarchical document to a unique visualization model node that visually represents each hierarchical document to be displayed on a graphical user interface". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of converting each hierarchical document to a unique visualization model node that visually represents each hierarchical document to be displayed on a graphical user interface. There is no correspondence to or disclosure of Applicants' third element of claim 13 found in the Smith or

Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 13, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fourth element of claim 13 (currently amended), the fourth element of claim 13 includes the limitation "using the similarity search results, creating a unique visualization model edge that visually represents the similarities between the reference hierarchical document and each hierarchical document in the result set to be displayed on a graphical user interface". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of using the similarity search results, creating a unique visualization model edge that visually represents the similarities between the reference hierarchical document and each hierarchical document in the result set to be displayed on a graphical user interface. There is no correspondence to or disclosure of Applicants' fourth element of claim 13 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 13, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended fifth element of claim 13 (currently amended), the fifth element of claim 13 includes the limitation "indicating a degree of similarity between the displayed unique visualization model nodes by the displayed unique visualization model edges". There is no disclosure in the Smith or Wheeler reference of indicating a degree of similarity between visualization model nodes by the visualization model edges. There is no correspondence to or disclosure of Applicants' fifth element of claim 13 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 13, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 14 (currently amended), Applicants believe that claim 14 is not unpatentable over the cited references. Since claim 14 is dependent on claim 13, which has been shown above to be nonobvious, claim 14 (currently amended) is also nonobvious under 35 U.S.C. § 103(a). Therefore the rejection of claim 14 is unsupported by the cited references, and should be withdrawn. Furthermore, claim 14 includes the limitations "displaying the unique visualization model edge and the unique visualization model node on a graphical user interface." The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith or Wheeler reference of displaying the unique visualization model edge and the unique visualization model node on a graphical user

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interface. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 14, as amended, is unsupported by the cited references, and should be withdrawn.

Considering independent claim 18 (currently amended), the Office is incorrect in the assertion that the abstract of the Smith reference discloses a computer-readable medium containing instructions for a visualization model of similarity relationships between documents. There is no disclosure in Smith of a computer-readable medium containing instructions for a visualization model of similarity relationships between documents, or of a generic search function.

Regarding the first element of independent claim 18 (currently amended), the first element includes the limitation "performing a similarity search in a database based on at least one reference attribute of at least one reference document to find at least one target document with at least one target attribute having a similarity relationship to the at least one reference attribute". The Office is incorrect in interpreting the Smith reference as performing a search. The Office citation in Smith (col. 8, lines 54-57) describes a database filter, which may function as a generally conventional relational database filter. Database filters are distinguishable from similarity search engines, as disclosed in the Wheeler reference, which is incorporated by reference into the present disclosure. The first element of independent claim 18 broadly describes the similarity search functions disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the second element of claim 18 (currently amended), the second element of includes the limitation "creating unique visualization model nodes corresponding to the at least one reference document and the at least one target document". The Office is incorrect in

interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of creating unique visualization model nodes corresponding to the at least one reference document and the at least one target document. There is no correspondence to or disclosure of Applicants' second element of claim 18 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 18, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended third element of claim 18 (currently amended), the third element of claim 18 includes the limitation "assigning properties to the unique visualization model nodes including form item, link count, group ID, hidden count, locked, caption, color, hierarchical level, selected and ID". There is no disclosure in the Smith or Wheeler reference of the claimed assigned properties to the unique visualization model nodes. There is no correspondence to or disclosure of Applicants' third element of claim 18 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 18, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fourth element (formerly third element) of claim 18 (currently amended), the fourth element of claim 18 includes the limitation "creating unique visualization model edges corresponding to the similarity relationships between the at least one reference document and the at least one target document". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of creating unique visualization model nodes corresponding to the at least one reference document and the at least one target document. There is no correspondence to or disclosure of Applicants' fourth element of claim 18 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 18, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended fifth element of claim 18 (currently amended), the fifth element of claim 18 includes the limitation "assigning properties to the unique visualization model edges including from node, from node ID, to node, to node ID, query list, caption, color, visible, selected and ID". There is no disclosure in the Smith or Wheeler reference of the claimed assigned properties to the unique visualization model edges. There is no correspondence to or disclosure of Applicants' fifth element of claim 18 found in the Smith or Wheeler reference.

Since the cited prior art references fail to teach or suggest all the limitations of the Applicants'

claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 18, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the sixth element (formerly fourth element) of claim 18 (currently amended), the sixth element of claim 18 includes the limitation "displaying the unique visualization model nodes and the unique visualization model edges on a graphical user interface". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of displaying the unique visualization model nodes and the unique visualization model edges on a graphical user interface. There is no correspondence to or disclosure of Applicants' sixth element of claim 18 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 18, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended seventh element of claim 18 (currently amended), the seventh element of claim 18 includes the limitation "indicating a degree of similarity between the displayed unique visualization model nodes by the displayed unique visualization model edges".

There is no disclosure in the Smith or Wheeler reference of indicating a degree of similarity between visualization model nodes by the visualization model edges. There is no correspondence

to or disclosure of Applicants' seventh element of claim 18 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 18, as amended, is unsupported by the cited references, and should be withdrawn.

Considering independent claim 19 (currently amended), the Office is incorrect in the assertion that the Smith reference discloses a computer-readable medium containing instructions for a visualization model of similarities between documents. There is no disclosure in Smith of a computer-readable medium containing instructions for a visualization model of similarities between documents, or of a generic search function.

Regarding the first element of independent claim 19 (currently amended), the first element includes the limitation "displaying a reference hierarchical object". The Office is incorrect in interpreting the Smith reference as displaying a reference hierarchical object. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no correspondence to or disclosure of Applicants' first element of claim 19 found in the Smith reference. The first element of independent claim 19 is broadly disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the second element of claim 19 (currently amended), the second element of includes the limitation "allowing a user to initiate a similarity search, based on at least one

attribute of the reference hierarchical object, to find at least one target hierarchical object". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The Office citation in Smith (col. 8, lines 54-57) describes a database filter, which may function as a generally conventional relational database filter. Database filters are distinguishable from similarity search engines, as disclosed in the Wheeler reference, which is incorporated by reference into the present disclosure. There is no correspondence to or disclosure of Applicants' second element of claim 19 found in the Smith reference. The second element of independent claim 19 is broadly disclosed in the Wheeler reference incorporated into Applicants' disclosure.

Regarding the third element of claim 19 (currently amended), the third element of claim 19 includes the limitation "visually representing a unique visualization model reference node corresponding to the reference hierarchical object and a unique visualization model target node corresponding to the at least one target hierarchical object that meet a similarity search criteria". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a springbased model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of visually representing a unique visualization model reference node corresponding to the reference hierarchical object and a unique visualization model target node corresponding to the at least one target hierarchical object that meet a similarity search criteria. There is no correspondence to or disclosure of Applicants' third element of claim 19 found in the Smith or Wheeler reference. Since the cited prior art

references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 19, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fourth element of claim 19 (currently amended), the fourth element of claim 19 includes the limitation "visually representing a unique visualization model edge corresponding to a similarity relationship between the reference hierarchical object and each target hierarchical object". The Office is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of visually representing a unique visualization model edge corresponding to a similarity relationship between the reference hierarchical object and each target hierarchical object. There is no correspondence to or disclosure of Applicants' fourth element of claim 19 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 19, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the fifth element of claim 19 (currently amended), the fifth element of claim 19 includes the limitation "displaying the visual representations of the unique visualization model nodes and the unique visualization model edge on a graphical user interface". The Office

is incorrect in interpreting the Smith reference as disclosing this limitation. The first Office citation in Smith (col. 8, lines 64-67) describes a rendering engine that renders a network graphical visualization according to results obtained by a database filter and user selections. The second Office citation in Smith (col. 9, lines 24-40) describes the strength of links between nodes in the visualization indicted by relative lengths of the links. The links may be based on a spring-based model representing forces between nodes, or the number of posters who post messages to the linked nodes. There is no disclosure in the Smith reference of displaying the visual representation of the unique visualization model nodes and the unique visualization model edges on a graphical user interface. There is no correspondence to or disclosure of Applicants' fifth element of claim 19 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 19, as amended, is unsupported by the cited references, and should be withdrawn.

Regarding the currently appended sixth element of claim 19 (currently amended), the sixth element of claim 19 includes the limitation "indicating a degree of similarity between the displayed unique visualization model nodes by the displayed unique visualization model edges". There is no disclosure in the Smith or Wheeler reference of indicating a degree of similarity between visualization model nodes by the visualization model edges. There is no correspondence to or disclosure of Applicants' sixth element of claim 19 found in the Smith or Wheeler reference. Since the cited prior art references fail to teach or suggest all the limitations of the Applicants' claim, this claim is nonobvious under 35 U.S.C. § 103(a). Therefore, the rejection of claim 19, as amended, is unsupported by the cited references, and should be withdrawn.

Considering dependent claim 22 (new), since claim 22 depends on independent claim 1, which has been shown above to be nonobvious under 35 U.S.C. § 103(a), dependent claim 22 (new) is also nonobvious under 35 U.S.C. § 103(a).

Considering dependent claims 20 (new) and 23 (new), since claims 20 and 23 depend on independent claim 4, which has been shown above to be nonobvious under 35 U.S.C. § 103(a), claims 20 (new) and 23 (new) are also nonobvious under 35 U.S.C. § 103(a).

Considering dependent claim 24 (new), since claim 24 depends on independent claim 8, which has been shown above to be nonobvious under 35 U.S.C. § 103(a), dependent claim 24 (new) is also nonobvious under 35 U.S.C. § 103(a).

Considering dependent claims 21 (new) and 25 (new), since claims 21 and 25 depend on independent claim 13, which has been shown above to be nonobvious under 35 U.S.C. § 103(a), claims 21 (new) and 25 (new) are also nonobvious under 35 U.S.C. § 103(a).

Summary

The responses detailed above rebut the assertions by the Office of obviousness of Applicants' invention, since all the elements of Applicants' claimed invention are not found in the cited reference of Smith and Wheeler. The responses substantiate the nonobviousness of claims 1-19 of Applicants' specification over the cited references. Since the rejections are unsupported for failure to find all Applicants' claim limitations in the cited references, the rejections should be withdrawn.

Applicants have made a diligent effort to distinguish the present invention over the referenced art and to place the claims in condition for allowance. However, should there remain unresolved issues that require adverse action, it is respectfully requested that the Examiner telephone Douglas D. Russell, Applicants' Attorney at 512-338-4601 so that such issues may be

resolved as expeditiously as possible. For these reasons, and in view of the above amendments, this application is now considered to be in condition for allowance and such action is earnestly solicited. Reconsideration and further examination is respectfully requested.

Respectfully Submitted,

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